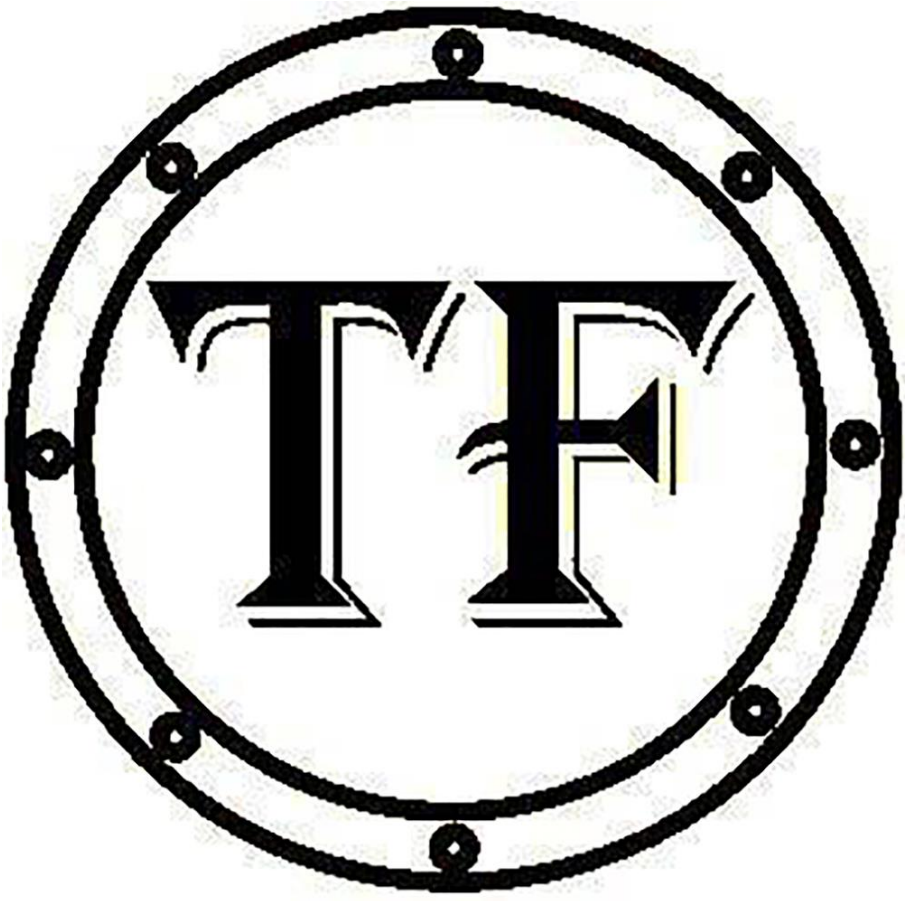
Blind Flange

A blind flange is a solid steel piece with no bore (interior diameter) and primarily designed to cap off a line.

As the majority of flange connections allow for the passing through of air or fluid via an interior opening, blinds give the ends of pipe connections a well-formed termination point or rerouting of the media in question towards another portion of the pipe assembly.



Opt for a blind flange in these cases, as well as in instances when a pipe line requires a future modification, such as the installation of a valve or fitting to reroute flow.

The majority of blind flanges are of basic constitution, require minimal machining compared to other flanges, and weigh more than most options given the lack of a bore.

Although these are typically provided as blanks to match up to slip on and weld neck flanges, we offer them custom machined as well.

Popular alterations include NPT threads in the center, as well as custom bore holes to function as slip on flanges without hubs.

Blind flanges can also be furnished with high hubs on higher pressure applications (most API 6BX blinds have high hubs as a requirement).

The three most popular forms of face connections for blind flanges are typically going to match the mating flange in question.

These include raised face, flat face, and ring joint (RTJ) face seals. The first two are more common in basic sealing applications, with RTJ being the face of choice for higher pressure applications.

In specifications from decades past, including B16.1 and other industrial standard cast steel requirements, blind flanges would often contain a slight recess in the center portion of the raised face.

This recess allowed for the mating of the end of pipe into the connecting flange and allowing for a seal to form between this connecting flange and the blind.

The larger OD blind flanges opted for a concave recess through the body of the blind to create a dished head formation at the top of the flange.

As the older cast iron specification is relatively obsolete, most blind flanges will not be made in these styles. Instead, opt for a modern blind flange with or without a hub.

Ensure the safety and efficiency of your pipeline system with a high-quality blind flange. Designed to handle various pressure ratings and equipped with precision-engineered bolt holes, blind flanges provide a reliable seal for isolating sections, conducting maintenance, or testing.

Their robust design ensures durability and performance under demanding conditions. Don’t compromise on quality when securing your operations. Contact us today to find the perfect blind flange for your system and experience unmatched reliability and peace of mind!

What is a blind flange?

A blind flange is a flat, circular plate used to close or seal the end of a pipe or pipeline. It is commonly used in piping systems to block off flow and prevent the escape of fluids, gases, or other materials.

Blind flanges are available in various sizes and materials to match the specific requirements of the pipeline they are used with.

What are the advantages of blind flanges?

Blind flanges are relatively simple to install and remove compared to welded or bolted pipe closures, and they provide a secure seal for the end of a pipe, preventing leaks and ensuring that the pipeline remains pressurized or safe.

When should I use a blind flange?

When a pipeline is not in use or needs to be closed off temporarily, a blind flange is the ideal solution to seal the end and prevent leaks.

Blind flanges are useful during maintenance operations where sections of the pipeline need to be sealed off while work is carried out on the system.

When should I not use a blind flange?

Blind flanges completely block off the pipe, which makes them unsuitable for applications where continuous flow of liquids or gases is necessary.

In situations where a significant amount of pressure or fluid velocity is present, the blind flange may not provide a reliable seal or could potentially fail under extreme conditions.

What are the different types of blind flanges?

Blind flanges are available in various types, including slip-on flanges, threaded flanges, weld neck flanges, and socket weld flanges.

These types allow for flexibility in choosing the best blind flange depending on the specific requirements of the pipeline system, such as pipe size, pressure, or installation method.